

Amendments to the Claims:

1-13. (Cancelled)

14. (Currently Amended) An apparatus for providing a modular runtime environment architecture comprising:

a single virtual machine implementation, embodied in at least one tangible computer-readable storage medium and executable utilizing at least one processor, the single virtual machine implementation providing virtual machine functionality;

a plurality of support libraries, embodied in the at least one tangible computer-readable storage medium, each support library of the plurality of support libraries includes library functions, the virtual machine functionality supported by each support library of the plurality of support libraries, the plurality of support libraries including a first implementation of a specific support library and a second implementation of the specific support library; and

a bi-directional virtual machine interface embodied in the at least one tangible computer-readable storage medium, the bi-directional virtual machine interface including a set of functions for executing virtual machine implementation-dependent library operations performable by the single virtual machine implementation, the set of functions callable by at least one function of the first implementation of the specific support library for executing a virtual machine implementation-dependent library function of the first implementation of the specific support library and by at least one function of the second implementation of the specific support library for executing a virtual machine implementation-dependent library function of the second implementation of the specific support library such that the first implementation of the specific support library can be replaced with the second implementation of the specific support library the bi-directional virtual machine interface for communication between a first support library from the plurality of support libraries and the single virtual machine implementation, the bi-directional virtual machine interface defining virtual machine implementation-dependent operations performed by the virtual machine implementation, the bi-directional virtual machine interface supports communication between a second support library from the plurality of support libraries, capable of replacing the first support library, and the virtual machine implementation without modification of the bi-directional virtual machine interface or the single virtual machine implementation.

15. (Cancelled)

16. (Cancelled)

17. (Currently Amended) A runtime environment, embodied in at least one tangible computer-readable medium, suitable for use in conjunction with one virtual machine implementation and a plurality of support libraries, the runtime environment comprising:

a virtual machine implementation, embodied in at least one tangible computer-readable storage medium and executable utilizing at least one processing unit;

a plurality of support libraries, embodied in the at least one tangible computer-readable storage medium, comprising a first implementation of a specific support library including library functions with at least some of the that includes library functions able to call virtual machine implementation-dependent functions that perform virtual machine implementation-dependent operations and a second implementation of the specific support library that includes library functions that perform virtual machine implementation-dependent operations; and

a virtual machine interface, embodied in the at least one tangible computer-readable storage medium, the virtual machine interface including a set of functions for executing virtual machine implementation-dependent library operations performable by the virtual machine implementation, the set of functions callable by the library functions of the first implementation of the specific support library and by the library functions of the second implementation of the specific support library such that the first implementation of the specific support library can be replaced with the second implementation of the specific support library without modification of the virtual machine interface or the virtual machine implementation that facilitates communications between the first support library and the virtual machine implementation, the virtual machine interface defining virtual machine dependent operations performed by the virtual machine implementation, [1] the virtual machine interface defines operations that are virtual machine implementation-dependent;

wherein the virtual machine implementation-dependent library operations performable by the virtual machine implementation include at least one of operations that control the virtual machine implementation, operations that access data managed by the virtual machine implementation, or operations that perform input/output the runtime environment is suitable for use in conjunction with a second support library from the plurality of support libraries, capable of replacing the first support library, that has library functions with at least some of the library functions able to call virtual machine implementation-dependent functions that perform virtual machine implementation-dependent operations, the second support library able to conform to the virtual machine interface.